

A Note on the Natural History of *Pleurobranchaea spec.* (Gastropoda : Opisthobranchia)

BY

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WHEN MANY FINE SPECIMENS of *Pleurobranchaea* sp.¹ were brought in from Santa Cruz Island in late February of this year by divers of the Biological Sciences Department of the University of California at Santa Barbara, it was decided to begin a series of experiments on them for this research. Preliminary behavioral tests were begun, to be later supplemented by further, more refined work of the same type and by recordings from the nerves of the rhinophores. Unfortunately, on another trip to the island in early July, the divers could not locate additional needed animals. Although it may be some time before the experiments may be begun again, if it is so decided, I believe that these preliminary notes would be of interest at this time.

The *Pleurobranchaea*, which had been taken from between twenty and forty feet on a fine sand bottom, are about as active a mollusk as can be found. In aquaria, they move rapidly, rarely remaining long in any one spot. Their feeding behavior is extraordinary. They seem to be entirely carnivorous, and, when hungry, will attack any animal offered. They will even attack members of their own species, if more than one is left in a single tank. Such attacks are accompanied by violent thrashing. When suitable prey touches or is touched by their sensitive anterior end, they react with a quick upward curving of the anterior end around the prey. The proboscis is rapidly extended, and the prey or pieces of it are taken in.

During the experimentation, certain chemicals, including pure solutions of various amino acids, dissolved in boiled, filtered sea water were placed with a dropper near one rhinophore of a submerged specimen. A feeding response in which the animal raised its anterior end, curved it forward, and extended its proboscis, was elicited by juice from a crushed *Mytilus* and by some amino acids. Other chemicals tested elicited only searching behavior, which consisted of lifting and side to side movement of the anterior end, and bending of the rhinophores. A control, boiled, filtered sea water gave no reaction.

Near the end of June the *Pleurobranchaea* began to lay eggs; however, it is well known that the behavior of lab-

¹ identified by Mr. Allyn G. Smith, California Academy of Sciences, San Francisco, California.

oratory animals in this regard may not be a good indication of the behavior of the species in nature. The eggs are white and were extruded in a lace-like band about a half inch wide and three inches long. This was attached to the side of the aquarium along one margin of the band.

A New Introduced Land Snail

BY

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A New Introduced California Land Snail

FROM THE OFFICE OF THE INSECT TAXONOMY LABORATORY, Bureau of Entomology, California State Department of Agriculture, the California Academy of Sciences has received a sizeable series of the common middle western pupillid—*Pupoides albilabris* (C. B. ADAMS, 1841)—from a *Dichondra* and *Lippia* lawn in Brawley, Imperial County, California. The snails were collected by Messrs. J. Thayer and R. A. Flock, 23 September 1963.

The colony, which is evidently a thriving one consisting of both juvenile and adult individuals, is the first reported introduction in California that has apparently "taken hold." The western end of the range of the species is in the Dakotas, Colorado and western Arizona (Yuma County); it occurs also in the Mexican mainland, Baja California, and on Islas Angel de la Guarda, Tortuga, San Lorenzo, San Esteban, and Monserrate in the Gulf of California. A related species, *P. catalinensis* Hanna, 1923, occurs on Isla Santa Catalina in the Gulf.

A Misunderstanding

BY

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BECAUSE OF A MISUNDERSTANDING, erroneous information was given in my recent paper, *The Cypraea martini* of SCHEPMAN, 1907 (*The Veliger* 6(2): 80-84, pl. 15, 1963) regarding the origin of the shell and its collector. I wish to make the following correction: the shell was not collected during a phase of the Palawan Expedition in April 1962, but was taken, rather, by Romeo Lumawig of Manila. The dates and other pertinent information, however, are as originally chronicled.